AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Claims 1-37. (Canceled).

38. (Currently Amended) A system for the infusion of a pharmacological solution in a patient, comprising ~~a container arrangement suitable for containing the pharmacological solution,~~ a pumping device for generating a flow of ~~[[said]]~~a pharmacological solution ~~from said container arrangement~~ to a catheter insertable in the body of the patient, ~~[[and]]~~an adjusting device to vary said flow, and a command and control device operationally associated with said adjusting device, said adjusting device comprising a valve arrangement, said command and control device ~~commanding~~ being configured to command a pulsed actuation of said valve arrangement, said flow being determined by the number of actuations of the valve arrangement per unit time, said pulsed actuation being made according to an infusion cycle of the pharmacological solution.

39. (Canceled).

40. (Previously Presented) The system according to claim 38, wherein said valve arrangement comprises a valve of the normally closed type.

41. (Previously Presented) The system according to claim 38, wherein said valve arrangement comprises at least one solenoid valve.

42. (Canceled).

43. (Previously Presented) The system according to claim 38, wherein said command and control device comprises a microprocessor operationally connected to said valve arrangement.

44. (Canceled).

45. (Previously Presented) The system according to claim 38, wherein said pumping device comprises an elastomeric container wherein said pharmacological solution is inserted.

46. (Previously Presented) The system according to claim 45, wherein said elastomeric container is supported on a support element associated with a containing and protection element.

47. (Previously Presented) The system according to claim 46, wherein said containing and protection element is made of transparent material and is equipped on its outside surface with a graduated scale.

48. (Previously Presented) The system according to claim 46, wherein said containing and protection element comprises inlet portion connected to said elastomeric container to introduce therein said pharmacological solution.

49. (Canceled).

50. (Currently Amended) The system according to claim 48, wherein said inlet portion is associated with a connecting element suitable for enabling coupling of said inlet portion with an introducing device, to introduce said pharmacological solution into said inlet portion.

51. (Previously Presented) The system according to claim 47, wherein said containing and protection element furthermore comprises outlet portion connected to said elastomeric container, through which the pharmacological solution introduced into the elastomeric container can flow out thereof.

52. (Previously Presented) The system according to claim 51, wherein said outlet portion is suitable for being connected to a first end of a fitting element, a second end of which is connected to a valve arrangement comprised in said adjusting device.

53. (Canceled).

54. (Previously Presented) The system according claim 38, wherein said command and control device comprises an interface element for operationally connecting said command and control device with a data processing system.

55. (Previously Presented) The system according to claim 38, wherein said command and control device comprises a reading device suitable for receiving a data recording support and for reading data stored thereupon.

56. (Previously Presented) The system according to claim 55, wherein said data recording support is a data recording support of the smart-card type.

57. (Previously Presented) The system according to claim 38, wherein said command and control device is provided with an electric supply apparatus.

58. (Previously Presented) The system according to claim 57, wherein said electric supply apparatus comprises a battery.

59. (Previously Presented) The system according to claim 58, wherein said battery is of the rechargeable or replaceable type.

60. (Withdrawn) A method for the infusion of a pharmacological solution in a patient, comprising generating a flow of said pharmacological solution from a container containing said pharmacological solution, sending said flow to a catheter insertable in the body of said patient,

adjusting said flow by an adjusting device actuated by a command and control device, wherein it furthermore comprises programming said flow and infusion times by a programming device operationally connected to said command and control device.

61. (Withdrawn) The method according to claim 60, wherein said programming device comprises a data processing apparatus.

62. (Withdrawn) The method according to claim 61, wherein said data processing apparatus comprises a microprocessor which may be connected to said command and control device.

63. (Withdrawn) The method according to claim 60, wherein said data processing apparatus comprises a microprocessor being part of said command and control device.

64. (Withdrawn) The method according to claim 60, wherein said programming device comprises a reading device suitable for reading data stored on a data-storage support, said reading device being operationally associated with said command and control device.

65. (Withdrawn) The method according to claim 60, further comprising the following steps:

storing on a data-processing system or on a data-storage support definition parameters defining an infusion protocol of said pharmacological solution;

- calibrating said adjusting device;

- storing definition parameters of an infusion curve for said infusion protocol and calculating the profile of said curve;

- storing parameters relating to infusion cycles provided for by said infusion protocol.

66. (Withdrawn) The method according to claim 65, further comprising ascertaining that the quantity of pharmacological solution delivered on the basis of said infusion curve corresponds to the quantity provided for by said infusion protocol.

67. (Withdrawn) The method according to claim 65, further comprising ascertaining that the quantity of pharmacological solution infused in each of said infusion cycles does not deviate from a theoretical quantity provided for by said infusion protocol by a quantity greater than a preset quantity.

68. (Withdrawn) The method according to claim 65, wherein said definition parameters comprise at least one protocol identifier, the type of solution to be infused, and the total volume of solution to be infused.

69. (Withdrawn) The method according to claim 65, wherein said calibrating comprises measuring the quantity of solution delivered by said adjusting device for each opening interval of said adjusting device during an infusion cycle and ascertaining that the difference between said quantity and a preset quantity does not exceed a preset value.

70. (Withdrawn) The method according to claim 65, wherein said definition parameters of an infusion curve comprise: duration of the infusion, volume of pharmacological solution to be infused, number of repetitions of the infusion curve, shape of the infusion curve.

71. (Withdrawn) The method according to claim 65, furthermore comprising customising said infusion curve by modifying it on the basis of specific patient parameters.

72. (Withdrawn) The method according to claim 65, wherein said parameters relating to infusion cycles according to said protocol comprise: the type of infusion curve, or curves provided for by said protocol for said infusion cycle and the type of infusion cycle to be conducted.

73. (Withdrawn) The method according to claim 65, wherein said infusion cycle may be of the automatic startup or startup at preset times type.

74. (Withdrawn) The method according to claim 64, wherein said data-storage support is a data-storage support of a personal computer.